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FIRST NAMED INVENTOR APPLICATION NO. FILING DATE Guido Mennicken 23239 6978 05/03/2005 10/534,548 EXAMINER 12/08/2006 535 7590 **BOOSALIS, FANI POLYZOS** THE FIRM OF KARL F ROSS 5676 RIVERDALE AVENUE PAPER NUMBER ART UNIT **PO BOX 900**

> 2884 DATE MAILED: 12/08/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)
	10/534,548	MENNICKEN ET AL.
Office Action Summary	Examiner	Art Unit
	Faye Boosalis	2884
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply		
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).		
Status		
 1) ⊠ Responsive to communication(s) filed on 21 January 2006. 2a) □ This action is FINAL. 2b) ⊠ This action is non-final. 3) □ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213. 		
Disposition of Claims		
4) Claim(s) 1-21 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration. 5) Claim(s) is/are allowed. 6) Claim(s) 1-21 is/are rejected. 7) Claim(s) is/are objected to. 8) Claim(s) are subject to restriction and/or election requirement.		
Application Papers		
 9) The specification is objected to by the Examiner. 10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner. Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152. 		
Priority under 35 U.S.C. § 119		
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) □ All b) □ Some * c) □ None of: 1. □ Certified copies of the priority documents have been received. 2. □ Certified copies of the priority documents have been received in Application No 3. □ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received.		
Attachment(s) 1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date 5/3/05.	4) Interview Summary Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	ate

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DETAILED ACTION

Specification

1. The disclosure is objected to because of the following informalities: the specification does not include appropriate section headings.

The following guidelines illustrate the preferred layout for the specification of a utility application. These guidelines are suggested for the applicant's use.

Arrangement of the Specification

As provided in 37 CFR 1.77(b), the specification of a utility application should include the following sections in order. Each of the lettered items should appear in upper case, without underlining or bold type, as a section heading. If no text follows the section heading, the phrase "Not Applicable" should follow the section heading:

- (a) TITLE OF THE INVENTION.
- (b) CROSS-REFERENCE TO RELATED APPLICATIONS.
- (c) STATEMENT REGARDING FEDERALLY SPONSORED RESEARCH OR DEVELOPMENT.
- (d) INCORPORATION-BY-REFERENCE OF MATERIAL SUBMITTED ON A COMPACT DISC (See 37 CFR 1.52(e)(5) and MPEP 608.05. Computer program listings (37 CFR 1.96(c)), "Sequence Listings" (37 CFR 1.821(c)), and tables having more than 50 pages of text are permitted to be submitted on compact discs.) or REFERENCE TO A "MICROFICHE APPENDIX" (See MPEP § 608.05(a). "Microfiche Appendices" were accepted by the Office until March 1, 2001.)
- (e) BACKGROUND OF THE INVENTION.
 - (1) Field of the Invention.
 - (2) Description of Related Art including information disclosed under 37 CFR 1.97 and 1.98.
- (f) BRIEF SUMMARY OF THE INVENTION.
- (g) BRIEF DESCRIPTION OF THE SEVERAL VIEWS OF THE DRAWING(S).
- (h) DETAILED DESCRIPTION OF THE INVENTION.
- (i) CLAIM OR CLAIMS (commencing on a separate sheet).
- (j) ABSTRACT OF THE DISCLOSURE (commencing on a separate sheet).
- (k) SEQUENCE LISTING (See MPEP § 2424 and 37 CFR 1.821-1.825. A "Sequence Listing" is required on paper if the application discloses a nucleotide or amino acid sequence as defined in 37 CFR 1.821(a) and if the required "Sequence Listing" is not submitted as an electronic document on compact disc).

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Appropriate correction is required.

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1, 21 provide for the use of a method of coding information on articles, characterized in that for coding the information a fluorescent dyestuff is used, but, since the claim does not set forth any steps involved in the method/process, it is unclear what method/process applicant is intending to encompass. A claim is indefinite where it merely recites a use without any active, positive steps delimiting how this use is actually practiced. Therefore no further search has

Claims 1, 21 are rejected under 35 U.S.C. 101 because the claimed recitation of a use, without setting forth any steps involved in the process, results in an improper definition of a process, i.e., results in a claim which is not a proper process claim under 35 U.S.C. 101. See for example *Ex parte Dunki*, 153 USPQ 678 (Bd.App. 1967) and *Clinical Products, Ltd.* v. *Brenner*, 255 F. Supp. 131, 149 USPQ 475 (D.D.C. 1966).

2. Claim 4 recites the limitation "the following compounds" in lines 2-3. There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

⁽b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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4. Claims 1-3 are rejected under 35 U.S.C. 102(b) as being anticipated by *Gonzalez* et al (US 6,380,547 B1).

Regarding claim 1, Gonzalez discloses a method of coding information on articles, characterized in that for coding the information a fluorescent dyestuff is used (i.e. laser luminophore suitable for uses as a laser pumped dye)(See Abstract and col. 1, lines 54-65, col. 5, lines 19-26).

Regarding claim 2, Gonzalez discloses a method characterized in that a fluorescent dyestuff (i.e. laser luminophore) is used which fluoresces within a few nanoseconds up to several hundred milliseconds following excitation with energy-rich light (col. 5, lines 20-26).

Regarding claim 3, Gonzalez discloses the fluorescent dyestuff used emits light in the wavelength range of 300 to 2500 nm (col. 5, lines 31-32).

5. Claims 13-15, 17 and 19 are rejected under 35 U.S.C. 102(b) as being anticipated by Oshima et al (US 6,303,929 B1).

Regarding claim 13, Oshima discloses a device for evaluating coded information which has been coded by means of a fluorescent dyestuff (18), comprising at least one light source (27) and at least one detector (36), characterized in that the light source and the detector are arranged in a detection chamber (See Fig. 31) and a device (26) includes means for controlling the light emission (See Fig. 31 and col. 52, lines 23-39).

Regarding claim 14, Oshima discloses shielding against foreign light to avoid generating false information (col. 8, lines 32-46).

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Regarding claim 15, Oshima discloses the light source (27) and the detectors (36) are distributed over the interior of the detection chamber (See Fig. 31).

Regarding claim 17, Oshima discloses the reading head (25) is equipped with light guides (30) for emitting light and light guides for the fluorescent light (26) (See Fig. 31).

Regarding claim 19, Oshima discloses the light pulses are synchronized in time with the detector (detection unit) (93) (col. 61, lines 59-67 and col. 62, lines 1-11 and lines 39-57).

Collar

Claim Rejections - 35 USC § 103

- 6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 7. Claim 4-12 and 20-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over *Gonzalez et al (US 6,380,547 B1)* as applied to claim 1 above, and further in view of *Oshima et al (US 6,303,929 B1)*.

Regarding claim 4, Gonzalez discloses a method of coding information on articles; characterized in that for coding the information a fluorescent dyestuff is used (i.e. laser luminophore suitable for uses as a laser pumped dye)(See Abstract and col. 1, lines 54-65, col. 5, lines 19-26) and the dyestuff compound used is a polycyclic chemical compound (col. 5, lines 19-20). Gonzalez does not specifically disclose of a

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compound. Oshima discloses a method of detecting a mark containing a fluorescent substance wherein a compound is used such as; rhodamine (col. 68, lines 50-58). Oshima teaches fluorescent mark (210) is prepared by the use of a transparent inking medium containing fluorescent microparticles capable of being excited by irradiation of infrared rays of light which mircoparticles are dispersed and retained in a binder. The fluorescent particles may be microparticles of an organic compound (i.e. rhodamine, thioflavine, Eosine or an inorganic compound) (col. 68, lines 50-58). Therefore, it would be obvious to modify the method suggested by Gonzalez, to use a compound such as rhodamine, as disclosed supra by Oshima, to allow for a more versatile means of coding information on an article.

Regarding claims 5-6, Oshima discloses different fluorescent dyestuff, differing only slightly in absorption characteristics but significantly in emission characteristics, are used simultaneously (col. 55, lines 2-8).

Regarding claims 7-9, Gonzalez discloses bar codes and fluorescent dyestuffs are used for coding of information are used and the dyestuff is applied in a diffused pattern to the article (col. 3, lines 15-44 and col. 5, lines 1-11).

Regarding claim 10, Gonzalez discloses fluorescent dyestuff is applied by a printing process to the article (i.e. process for marking an article) (col. 1, lines 43-53).

Regarding claim 11, Oshima discloses fluorescent dyestuff in which do not fluoresce (col. 24, lines 21-33).

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Regarding claim 12, Oshima discloses the fluorescent dyestuff is introduced during the manufacturing process of the material and the article and characterizes it (see claims 1-2).

Regarding claim 20, Oshima discloses the light sources have a spectrum between 200 to 1800 nm (i.e. 700 to 1000) (col. 39, lines 15-20).

Regarding claim 21, Oshima discloses a method of evaluating coded information which has been coded (col. 60, lines 15-30).

8. Claim 16 is rejected under 35 U.S.C. 103(a) as being unpatentable over *Oshima* et al (US 6,303,929 B1) as applied to claim 13 above, and further in view of *Liang* et al (US 5,719,948 A).

Regarding claim 16, Oshima discloses a device for evaluating coded information which has been coded by means of a fluorescent dyestuff (18), comprising at least one light source (27) and at least one detector (36), characterized in that the light source and the detector are arranged in a detection chamber (See Fig. 31) and a device (26) includes means for controlling the light emission (See Fig. 31 and col. 52, lines 23-39). Oshima does not disclose the inner surface of the chamber including a coating. Liang discloses an apparatus for fluorescent imaging and optical character reading wherein housing (200) holds and encloses element of the system, shielding the optical paths from stray light (col. 8, lines 41-60). Liang teaches the housing (200) holds and encloses other elements of the system, maintaining optical alignment, shielding the optical paths from stray light, and protecting the user from unnecessary exposure to UV light. Housing (200) should enclose at least the illumination portion optical path portion

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(15), UV source (10) and visible/IR source (20), splitter (30), filters (50) if any, and detector (40), and may enclose all other elements as well (col. 8, lines 41-60). Therefore, it would have been obvious to modify the apparatus disclosed by Oshima, to include a housing shielding stray light, as disclosed supra by Liang, to allow for a more versatile apparatus.

9. Claim 18 is rejected under 35 U.S.C. 103(a) as being unpatentable over *Oshima* et al (US 6,303,929 B1) as applied to claim 13 above, and further in view of *Liang et al* (US 5,414,258 A).

Regarding claim 16, Oshima discloses a device for evaluating coded information which has been coded by means of a fluorescent dyestuff (18), comprising at least one light source (27) and at least one detector (36), characterized in that the light source and the detector are arranged in a detection chamber (See Fig. 31) and a device (26) includes means for controlling the light emission (See Fig. 31 and col. 52, lines 23-39). Oshima does not disclose the reading head comprising a collar. Liang discloses an apparatus for calibration of fluorescence detectors comprising a detector (60) with a rubber like collar (i.e. O-ring made of resilient polymeric material) (65) (See Fig. 2 and col. 4, lines 62-68). Liang teaches the adapter end (60) of the apparatus is shown with an O-ring (65), as a simple example of flexible means of temporarily securing the calibration apparatus to the optical front end (70). O-ring (65) is made of a resilient polymeric material suitably dimensioned to fit over the outer diameter of the optical front end (70) of the fluorescence detector to be calibrated (See Fig. 2 and col. 4, lines 62-68). Therefore, it would have been obvious to modify the apparatus disclosed by

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Oshima, to include a collar like attachment to the reading head, as disclosed supra by Liang, to allow for a more versatile apparatus.

Conclusion

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Faye Boosalis whose telephone number is 571-272-2447. The examiner can normally be reached on Monday thru Friday from 7:30 AM to 4:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dave Porta can be reached on 571-272-2444. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

12. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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